Las Vegas McCarran International Airport Draft Supplemental Environmental Assessment Supplemental Noise Analysis Summary Information

The following data tables and map present supplemental information regarding the noise analysis developed for the Las Vegas McCarran International Airport Draft Supplemental Environmental Assessment published in November of 2005. This data was developed in addition, and as a supplement, to the extensive noise analysis presented in the draft SEA document. The summary data was primarily developed to assist in answering specific and/or detailed questions from the general public regarding the noise effects associated with the project at the public workshops conducted on December 12 and 13 2005. The supplemental noise analysis is presented for a selected group of location points within the study area. These points were selected to be representative of the general areas where flight route changes would occur. The noise model provides specific and detailed computations for each location. The locations are mapped on the attached Exhibit on the final page of this document. The following bullet-points describe the data presented in the tables and provide a context for correctly understanding and interpreting the meaning of the data.

- → All data presented is based on computer noise modeling using the FAA's Integrated Noise Model.
- → The data presents results for the 2005 condition noise evaluation.
- → The tables present the following information:
 - Point ID The name code of the point referenced. The points are generally presented in order of progressively increasing distance from the departure end of Runways 25L/R. Points to the west and north are orderd first with points to the south following.
 - Direction from Airport This is an indicator of the general direction from the airport to the location of the point
 - o <u>Highest Lmax (dB)</u> This metric represents the highest instantaneous outdoor noise level computed for each location. It should be noted that this noise level would likely only occur for a brief moment at each site. The

computation is limited to departures from Runway 25L or 25R on the average annual day of operations estimated for 2005.

- o <u>Avg. Daily Flights > 60 dB</u> This metric presents the count of number of flights on the average annual day that would have Lmax (brief moment) outdoor noise levels greater than 60 dB. The computation is limited to departures from Runway 25L or 25R on the average annual day of operations estimated for 2005.
- Avg. Daily Flights > 65-70 dB These metrics are identical to the previous metric but with different specified noise level thresholds (65 through 75 dB) The computation is limited to departures from Runway 25L or 25R on the average annual day of operations estimated for 2005.
- O Avg. Daily Time Above 65 dB (minutes) This metric presents the number of minutes per day (24hr period) that the outdoor noise level would exceed 65 dB due to average annual day aircraft operations. It should be noted that this calculation includes contributions from all aircraft operations, not just departures from Runways 25L/R.
- There are separate data tables for the 2005 No Action condition, the 2005 Proposed Action condition, and the change between the No Action and Proposed Action 2005 conditions.
- → The map presented after the tables illustrates the location of the points evaluated.

Table 1

2005 No Action Summar	2005 No Action Summary																		
Point ID	D1	S4	D2	S5	S6	S7	S3	D3	S1	S2	S8	D4	D8	D9	M6	M7	D5	D6	D7
Direction from Airport	W	N	Ν	N	N	Ν	Ν	Ν	Ν	Ν	Ν	Ν	Ν	Z	S	S	S	S	S
Highest Lmax (dB)	87.8	84.6	68.7	78.8	75.9	73.5	78.6	69.2	67.8	75.9	68.7	65.0	48.3	43.1	86.9	88.3	82.2	80.0	71.8
Avg. Daily Flights > 60 dB	61.8	1.4	0.2	0.3	0.7	2.8	8.7	0.0	0.3	2.6	0.0	0.0	0.0	0.0	246.2	248.7	180.8	22.2	8.0
Avg. Daily Flights > 65 dB	22.7	0.7	0.0	0.1	0.1	0.6	1.5	0.0	0.0	1.2	0.0	0.0	0.0	0.0	195.0	197.5	47.7	10.8	0.5
Avg. Daily Flights > 70 dB	4.6	0.1	0.0	0.0	0.0	0.0	0.9	0.0	0.0	0.6	0.0	0.0	0.0	0.0	40.9	57.5	21.8	1.3	0.0
Avg. Daily Flights > 75 dB	1.1	0.1	0.0	0.0	0.0	0.0	0.1	0.0	0.0	0.1	0.0	0.0	0.0	0.0	21.8	22.6	11.7	0.2	0.0
Avg. Daily Time Above 65																			ļ
dB (minutes)	3.4	1.3	0.3	2.4	0.9	6.6	16.5	0.1	0.1	3.4	0.0	0.0	0.0	0.0	28.9	35.1	13.4	2.3	0.1

Source: Landrum & Brown Analysis, 2005

Table 2

2005 Proposed Action Summary																			
Point ID	D1	S4	D2	S5	S6	S7	S3	D3	S1	S2	S8	D4	D8	D9	M6	M7	D5	D6	D7
Direction from Airport	W	N	Ν	Ν	Ν	Ν	Ν	Ν	Ν	Ν	N	Ν	Ν	Ν	S	S	S	S	S
Highest Lmax (dB)	88.2	84.9	79.7	80.5	77.5	77.8	73.8	70.3	72.3	72.0	67.1	65.2	49.1	34.6	86.9	88.3	82.2	80.0	71.8
Avg. Daily Flights > 60 dB	157.9	76.3	34.8	34.4	27.4	8.3	0.6	8.9	7.0	0.3	1.1	0.6	0.0	0.0	182.8	167.1	120.7	10.6	0.2
Avg. Daily Flights > 65 dB	115.3	19.4	8.6	10.9	9.0	1.9	0.1	1.4	1.3	0.1	0.8	0.3	0.0	0.0	128.9	129.8	30.2	4.1	0.1
Avg. Daily Flights > 70 dB	46.4	6.9	1.2	1.8	1.0	0.3	0.0	0.5	0.1	0.0	0.0	0.0	0.0	0.0	27.9	33.1	14.9	0.6	0.0
Avg. Daily Flights > 75 dB	11.7	0.9	0.1	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	13.9	15.4	7.6	0.2	0.0
Avg. Daily Time Above 65																			
dB (minutes)	20.4	4.7	1.5	3.7	2.4	6.7	16.1	0.3	0.2	3.2	0.1	0.0	0.0	0.0	18.6	23.1	10.5	1.4	0.1

Source: Landrum & Brown Analysis, 2005

Table 3

2005 Change Summary	2005 Change Summary (Proposed Action - No Action)																		
Point ID	D1	S4	D2	S5	S6	S7	S3	D3	S1	S2	S8	D4	D8	D9	M6	M7	D5	D6	D7
Direction from Airport	W	Ν	Ν	Ν	Ν	Ν	Ν	Ν	Ν	Ν	N	Ν	Ν	Ν	S	S	S	S	S
Highest Lmax (dB)	0.4	0.3	11.0	1.7	1.6	4.3	-4.8	1.1	4.5	-3.9	-1.6	0.2	8.0	-8.5	0.0	0.0	0.0	0.0	0.0
Avg. Daily Flights > 60 dB	96.1	75.0	34.6	34.2	26.7	5.5	-8.1	8.9	6.7	-2.2	1.1	0.6	0.0	0.0	-63.4	-81.6	-60.2	-11.6	-0.6
Avg. Daily Flights > 65 dB	92.5	18.8	8.5	10.8	8.9	1.3	-1.4	1.4	1.3	-1.1	0.8	0.3	0.0	0.0	-66.1	-67.7	-17.5	-6.6	-0.5
Avg. Daily Flights > 70 dB	41.8	6.8	1.2	1.8	1.0	0.3	-0.9	0.5	0.1	-0.6	0.0	0.0	0.0	0.0	-13.0	-24.4	-6.9	-0.7	0.0
Avg. Daily Flights > 75 dB	10.6	0.8	0.1	0.2	0.0	0.0	-0.1	0.0	0.0	-0.1	0.0	0.0	0.0	0.0	-7.9	-7.2	-4.2	0.0	0.0
Avg. Daily Time Above 65																			
dB (minutes)	17.0	3.4	1.2	1.3	1.5	0.1	-0.4	0.2	0.1	-0.2	0.1	0.0	0.0	0.0	-10.3	-12.0	-2.9	-0.9	0.0

Source: Landrum & Brown Analysis, 2005

